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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/600,534	06/23/2003	Joo-Yoen Lee	Q74256	5788

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EXAMINER

JONES, HEATHER RAE

ART UNIT	PAPER NUMBER
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2621

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PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/600,534	LEE, JOO-YOEN	
	Examiner	Art Unit	
	Heather R. Jones	2621	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 10 July 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-17 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-17 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 23 June 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

Response to Arguments

1. Applicant's arguments, filed July 10, 2007, with respect to the rejection(s) of claim(s) 1-17 have been fully considered and are persuasive. Therefore, the rejection has been withdrawn. However, upon further consideration, a new ground(s) of rejection is made in view of a newly found prior art reference.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Shen et al. (U.S. Patent 6,741,292) and in view of Ozkan et al. (U.S. Patent 7,032,236).

Regarding claim 1, Shen et al. discloses a digital video receiver, which receives and decodes a broadcasting program, creates a predetermined type of data stream and transmits a data stream to a recording/reproducing apparatus connected to the digital video receiver through an interface (Fig. 3; col. 5, lines 41-53), the digital video receiver comprising: a program information converter operable to convert program information included in the broadcasting program into a format suitable for the recording/reproducing apparatus (Fig. 4; col. 5, lines 64-67 – the set top box does the signal processing unless the signal is sent from the digital VCR). However, Shen et al. fails to disclose the broadcasting program

comprising program data, representing contents of the broadcast program, and program information; that the program information is decoded prior to the converting; and a stream generator operable to receive the converted program information and decoded program data included in the decoded broadcasting program data, and further operable to create a data stream with the converted program information and the decoded program data.

Referring to the Ozkan et al. reference, Ozkan et al. discloses a system which receives and decodes a broadcasting program comprising program data, representing contents of the broadcast program, and program information; creates a predetermined type of data stream and transmits a data stream to a recording/reproducing apparatus, the system comprising: a program information converter operable to convert program information included in the broadcasting program into a format suitable for the recording/reproducing apparatus, wherein the program information is decoded prior to the converting (Fig. 12 –step 250); and a stream generator operable to receive the converted program information and the decoded broadcasting program data, and further operable to create a data stream with the received information and data (Fig. 12 – generates control tables MGT, MDBT, CIT, STT, and TCIT and then formats the tables to create MPEG-2 PSI tables; Fig. 13).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have combined the receiver disclosed by Shen et al. and the idea of transmitting the program data with more than just

video and audio data as disclosed by Ozkan et al. in order to provide the user all the information about the program they are receiving, for example, the description about the show.

Regarding claim 2, Shen et al. in view of Ozkan et al. discloses all the limitations as previously discussed with respect to claim 1 as well as the digital video receiver further comprises a program information analyzer operable to analyze the program information included in the data stream (Ozkan et al.: Fig. 12 - step 253 and 255).

Regarding claim 3, Shen et al. in view of Ozkan et al. discloses all the limitations as previously discussed with respect to claim 1 including that the program information converter comprises a table generator operable to create at least one new table in a suitable format using at least one of a plurality of tables associated with the program information (Ozkan et al.: Fig. 12 – steps 257, 260, and 263).

Regarding claim 4, Shen et al. in view of Ozkan et al. discloses all the limitations as previously discussed with respect to claim 1 including that the program information is PSIP (Program and System Information Protocol) information and the broadcasting program is in Advance Television Systems Committee (ATSC) format (Ozkan et al.: Fig. 12 – steps 257 and 260 – MGT and STT tables are part of the PSIP).

Regarding claim 5, Shen et al. in view of Ozkan et al. discloses all the limitations as previously discussed with respect to claims 1 and 4 including that

at least one of a selection information table (SIT), a discontinuity information table (DIT), a program association table (PAT), and a program map table (PMT) is created using information contained in at least one of a Virtual Channel Table (VCT), Master Guide Table (MGT), System Time Table (STT), Event Information Table (EIT) and Extended Text Table (ETT) tables of the PSIP information (Ozkan et al.: Fig. 12 – Steps 257, 260, and 263).

Regarding claim **6**, Shen et al. in view of Ozkan et al. discloses all the limitations as previously discussed with respect to claim 1 including that the interface is in accordance with the IEEE 1394 standard (Shen et al.: Fig. 3).

Regarding claims **7-12**, these are method claims corresponding to the apparatus claims 1-6. Therefore, claims 7-12 are analyzed and rejected as previously discussed with respect to claims 1-6.

Regarding claim **13**, Shen et al. discloses a digital receiver for receiving data corresponding to a program and transmitting the received data to a recording device in a compatible format (Fig. 3; col. 5, lines 41-53), the digital receiver comprising: an input means for receiving the digital data corresponding to the program; a decoder operable to decode the data; and a program converter operable to convert the decoded data into the compatible format (Fig. 4; col. 5, lines 64-67 – the set top box does the signal processing unless the signal is sent from the digital VCR). However, Shen et al. fails to disclose the digital data comprising at least audio data, video data, and informational data corresponding

to the program; and a program converter operable to convert the decoded informational data into the compatible format.

Referring to the Ozkan et al. reference, Ozkan et al. discloses a system for receiving data corresponding to a program and transmitting the received data to a recording device in a compatible format, the system comprising: an input means for receiving the digital data corresponding to the program, wherein the digital data comprises at least audio data, video data and informational data corresponding to the program; an information decoder operable to decode the informational data; and a program converter operable to convert the decoded informational data into the compatible format (Fig. 12 – generates control tables MGT, MDBT, CIT, STT, and TCIT and then formats the tables to create MPEG-2 PSI tables; Fig. 13).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have combined the receiver disclosed by Shen et al. and the idea of transmitting the program data with more than just video and audio data as disclosed by Ozkan et al. in order to provide the user all the information about the program they are receiving, for example, the description about the show.

Regarding claim **14**, Shen et al. in view of Ozkan et al. discloses all the limitations as previously discussed with respect to claim 13 including that the digital receiver further comprises an information analyzer operable to separate the decoded informational data into a plurality of groups, wherein the groups are

distinguished by at type of information regarding the program (Ozkan et al.: Fig. 12 – Step 253).

Regarding claim **15**, Shen et al. in view of Ozkan et al. discloses all the limitations as previously discussed with respect to claims 13 and 14 including that the informational data is PSIP data in accordance with ATSC standards and the groups comprise at least one of EIT and ETT data (Ozkan et al.: Fig. 12 – steps 257 and 260 – MGT and STT tables are part of the PSIP, the other tables according to the PSIP will also be generated).

Regarding claim **16**, Shen et al. in view of Ozkan et al. discloses all the limitations as previously discussed with respect to claim 13 as well as the digital receiver further comprises a video decoder operable to decode the video data; an audio decoder operable to decode the audio data; and a bit stream generator operable to receive the decoded data, audio and informational data and generate a stream of data in a format compatible with the recording device (Shen et al.: Fig. 4; col. 5, lines 64-67 – the set top box does the signal processing unless the signal is sent from the digital VCR – the video and audio data would be decoded during the signal processing – Fig. 2; Ozkan et al.: Fig. 12 – information data).

Regarding claim **17**, Shen et al. in view of Ozkan et al. discloses all the limitations as previously discussed with respect to claims 13 and 15 including that the format compatible with the recording device is MPEG2 format (Ozkan et al.: Fig. 12 - Steps 257, 260, and 263).

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Heather R. Jones whose telephone number is 571-272-7368. The examiner can normally be reached on Mon. - Thurs.: 7:00 am - 4:30 pm, and every other Fri.: 7:00 am - 3:30 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Miller can be reached on 571-272-7353. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Heather R Jones
Examiner
Art Unit 2621

HRJ
October 15, 2007


ANDREW Y. KOENIG
PRIMARY PATENT EXAMINER